

1. Lipids emulsions do not form part complete Parenteral nutrition
 - a. True
 - b. False
2. Previously fat free PN was used, what is an example of the clinical manifestations that occurred?
 - a. Cholecystitis
 - b. Catheter sepsis
 - c. Fatty liver disease
 - d. Essential fatty acid deficiency
3. What role do lipids play as a part of paediatric parenteral nutrition
 - a. Providing high energy needs without carbohydrate overload
 - b. Delivery mechanism for fat soluble vitamins
 - c. Sole source of nutrition
 - d. Both a and b
4. Parenteral Nutrition Associated Cholestasis is found in what percentage of neonates?
 - a. 40%
 - b. 60%
 - c. 25%
 - d. 85%
5. Lipid emulsions are the main cause of PNAC
 - a. True
 - b. False
6. Omega 6 Fatty acids is made up of
 - a. Eicosapentanoic acid
 - b. Linoleic acid
 - c. Decosapentanoic acid
 - d. Arachadonic acid
7. Having the correct ratio of omega 3 and 6s is important. A property of Omega 6 is:
 - a. Increased inflammation
 - b. Decreased inflammation
 - c. Increased antioxidant activity
 - d. Increased biliary flow

8. Types of pure forms of lipid emulsions include
 - a. Soya
 - b. Fish
 - c. Olive
 - d. Both a and b

9. What is a property of MCT oil?
 - a. Rapidly available energy source
 - b. Rich in n9
 - c. Contains phytosterols
 - d. Lacks omega 3s

10. In premature infants, the presence of fish oil in mixed lipid emulsions has shown to:
 - a. Reverse cholestasis
 - b. Lower plasma phytosterol content
 - c. Decrease antioxidant activity
 - d. Decrease EPA and DHA

11. Which was the first lipid to be used commercially in PN?
 - a) Fish
 - b) Soya
 - c) Olive
 - d) MCT

12. Cyclical parenteral nutrition is used as alternative management strategy
 - a) true
 - b) False

13. Increased bile acid enterohepatic circulation, results in reduce bile flow which is hepatotoxic
 - a) True
 - b) False

14. Fish oils are associated with vasoconstriction
 - a) True
 - b) False

15. One of the benefits in using fish oils for premature infants is the presence of phytosterols
 - a) True
 - b) False